

It was a cool, dry summer. In Chicago, June was 1.3° F cooler than average, and precipitation was 3.3 cm below normal, whereas the average July temperature was down 2.1° F and precipitation was 2.2 cm below average. However, high moisture levels from spring precipitation were ample to keep most vegetation lush throughout the summer.

In western Illinois, Larry Hood deemed the weather "quite good for nesting birds." He noted good breeding success for a number of species including Northern Bobwhite, Yellow-billed Cuckoo, Eastern Kingbird, Dickcissel, and Eastern Meadowlark. Lee Sterrenburg, who birded extensively in south-central and southwestern Indiana, noted the expansion of Dickcissels, Blue Grosbeak, and Bell's Vireos. Many others shared these sentiments, suggesting that summer 2004 was an especially good breeding year for many species, and particularly the grassland, open country, and scrubland birds.

Two points cast a cloud over the season. First, extensive searching of southwestern Indiana's traditional Loggerhead Shrike turf yielded no shrikes nor any evidence of their presence. This is especially disturbing, as most of the state's former breeding birds were in this area. Secondly, the mid-July appearance of an apparently healthy adult Snowy Owl in central Indiana was both surprising and unsettling. Oddly, this happened to be the state's first record in the past 29 months. A previous hiatus of this magnitude has occurred only once during the last half-century. In light of recent suppositions about the impact of global warming on Arctic regions, it is conceivable that these observations are linked to habitat disturbances far to our north.

Abbreviations: Carl. L. (Carlyle Lake, s. IL); I.B.S.P. (Illinois Beach S.P., Lake, IL); Chau. (Chautauqua N.W.R., Mason); G.L.N.T.C. (Great Lakes Naval Training Center, Lake, IL); L. Cal. (L. Calumet, s. Chicago); L.M.S.F. (Lowden-Miller State Forest, Ogle, IL); Mill. B. (Miller Beach, IN, the southernmost point on L. Michigan); T.N.C.K.S. (The Nature Conservancy Kankakee Sands wetland, Newton, IN).

LOONS THROUGH VULTURES

Single nonbreeding Common Loons were reported in both states, a typical pattern for the Region. Pied-billed Grebes were plentiful, with at least five breeding records reported in Illinois and a peak count of 160 at Horseshoe L., Madison, IL 18 Jun (FHo). A very tardy Horned Grebe still lingered off Rainbow Beach, Chicago 4 Jun (DFS). The expected mid-Jul influx of American White Pelicans brought good numbers to w. Illinois, where the peak count was 532 at Chau. 29 Jul (RBj,

Illinois & Indiana



SBj). Extralimital pelican reports included 3 at L. Cal. 30 May through 12 Jun (WJM), a flock of 9 at that site 13 Jun (WJM), and a single in Union, IN 7 & 11 Jun (WHB). On 7 Jun, 41 Double-crested Cormorant nests, most containing 3-4 eggs, were discovered at the ISPAT Inland Steel night-heron colony in East Chicago, Lake, IN (ph. JSC). This is the Indiana lakefront's first known nesting record and the state's first successful breeding in more than 50 years.

Encouragingly, above-average numbers of American and Least Bitterns were reported in both states during the breeding season. In ne. Illinois, an estimated 20 Great Egret nests were present and at least 3 Little Blue Herons fledged at the L. Cal. rookery (WJM). The established rookery at Alorton, IL contained 20 Snowy Egret nests (9 young banded) and 200 Cattle Egret nests (39 young banded) 18 Jun (VK et al.). Black-crowned Night-Herons apparently fared well this breeding season, with 200 nests reported during the season at L. Cal. (WJM) and another (100) at Alorton, IL 18 June (VK et al.). Breeding Yellow-crowned Night-Herons

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were reported at Granite City, IL, where three nests fledged 3-4 young each (FHo). Black Vultures peaked at 28 in Franklin, IN 13 Jun (WHB); an extralimital bird in Kane, IL 8 Jun (RHo) was most unexpected.

WATERFOWL THROUGH CRANES

Mute Swans bred successfully in the L. Cal. area: 34 ads. and 22 young were counted there 31 May (DFS). Numerous Wood Duck broods were reported in both states. A decade ago, summer Gadwalls were quite rare in the Region, but this year there were four reports in Illinois, including a female with a brood of 8 at Hennepin L., IL 29 Jul (DFS). The latter site also yielded a male Northern Pintail 3 Jun and a female Redhead

with a brood of 4 on 15 Jul (DFS). Quite unusual for the date and s. location was a Bufflehead at Horseshoe L., *Madison*, IL 1–8 Jun (FHo). Multiple Hooded Merganser broods were reported in both states. Quite surprising was the occurrence of several Common Mergansers, including a male in *Will*, IL 3 Jun (DFS), a male in *Bureau*, IL 15 Jun, and a pair at the latter location 2 Jul (DFS). Also unexpected were female-plumaged Red-breasted Mergansers at *Hennepin L.*, IL 10 Jul (EWW) and at *Mill. B.* 13 Jul (MTo). The Region's largest concentration of breeding Ruddy Ducks was at *Hennepin L.*, IL where 102 ads. and young were reported 15 Jun (DFS).

In Jun and Jul, the Indiana Department of Natural Resources' reintroduction program released 8 Ospreys in each of the following counties: *Jasper*, *Kosciusko*, *Sullivan*, and *Crawford* (JSC). Elsewhere, at least eight Osprey nests were reported in Indiana and three more were in Illinois. A peak count of 45 Mississippi Kites was made at *Thebes*, *Alexander*, IL 5 Jun (DMK, TAM); both chicks at the established *Warrick*, IN nest site died 14 Jul when a storm destroyed the nest (Midge Lechner, *vide* JSC). An early Jun aerial survey of Indiana Bald Eagle nests revealed the presence of 85 chicks in 44 nests (JSC); there were also at least six nests in Illinois, including one on the Little Calumet R. that provided the first Chicago-area nesting record in more than a century (WJM). Red-shouldered Hawks were reported on the increase in ne. Indiana (Haw). At the regular nw. Illinois breeding site, two Swainson's Hawk territories were located in nw. *Kane* and two more in sw. *McHenry*, but no fledglings were reported (John Bergstrom, *vide* RMo). Most unusual was a summer-period Merlin at *Chau.* 11 Jun (RBj, SBj).

The Region's Wild Turkey population appears to be flourishing, as numerous reports of young came from both states. A number of double-digit Northern Bobwhite reports also suggest that this species is on the upswing; the peak tally was of 47 in *Sullivan* and *Greene*, IN 4 Jul (LWS). The season's only breeding King Rail report consisted of 2 ads. and 4 young at *Prairie Ridge W.M.A.*, IL 8 Jul (BSh). The largest Virginia Rail count was of 3–4 at T.N.C.K.S. 26 Jun (JHz); agitated pairs at L. Cal. 5 & 12 Jun (WJM) were suggestive of local nesting. Breeding-period Common Moorhen numbers continue to improve, with young noted at six Illinois and five Indiana locations. Sandhill Cranes nested in Illinois at *Lock & Dam 13*, *Whiteside*, where a pair and fledgling were noted 10 Jul (EWW); nesting also occurred in *Garden Prairie*

Slough, *Boone*, IL 15 Jul (DTW), and two family groups (ads. plus single chicks) were observed in *Kosciusko*, IN 25 Jun (JSC).

SHOREBIRDS

A molting Black-bellied Plover in *Fayette*, IL 25 Jul (DMK) was a trifle early. Reports of the endangered Piping Plover included an unbanded ad. at *Mill. B.* 29 Jul (JKC, DSt) and a single bird in *Madison*, IL 31 Jun (*vide* DMK). A concentration of 1500 Killdeer at



This Black Skimmer was photographed 23 July 2004 in Springfield, where it made a one-day appearance; it provided only the second Illinois record. Photograph by H. David Bohlen.

Carl. L. 16 Jul (DMK) constituted a remarkable count for Jul. The largest of four Illinois Black-necked Stilt reports consisted of 11 in w. *Alexander* 18 Jun (KAM). This species likely nested in *Greene*, IN, where a pair of ads. was found at *Goose Pond W.M.A.* 11 Jul (LWS) and 2 juvs. were observed 20 Jul (Peter Scott, *vide* LWS). The Region's only American Avocet report consisted of one at *Chau.* 14 Jul (RBj, SBj)—surely the Region's poorest showing in more than a decade. Selected high counts of migrant shorebirds included 1027 Lesser Yellowlegs at *Chau.* 29 Jul (RBj, SBj), 42 Solitary Sandpipers at *McGinnis Slough*, IL 30 Jul (WSS), 8 Willets at *Mill. B.* 27 Jul (MTo), 250 Semipalmated Sandpipers at *Rice Lake W.M.A.*, IL 31 Jul (TAM et al.), 972 Pectoral Sandpipers at *Chau.* 29 Jul (RBj, SBj), and 275 Stilt Sandpipers at *Rice Lake W.M.A.*, IL 31 Jul (TAM et al.).

The summer's largest Upland Sandpiper tallies consisted of 11 at the Universal mine in *Vermillion*, IN 9 Jul (LWS) and 5 at *Decatur*, IL 22 Jul (TAM, KAM et al.). The Indiana lakefront experienced another strong Whimbrel flight that yielded five records involving 7 birds. The only other Whimbrel was an inland bird at *Carl. L.* 23 Jul (DMK et al.). Alternate-plumaged Red Knots are quite rare in the Region; consequently, the single birds observed in *Marshall*, IN 29 Jul (MH, ph. SK) and at *Mill. B.* 31 Jul (JKC) were noteworthy. Early Baird's Sandpiper reports included singles in *Union*, IN 17 Jul (WHB), at *Carl. L.* 23 Jul (DMK), and in *Boone*, IN

29–31 Jul (RLH et al.). A single ad. Long-billed Dowitcher—noted with 7 Short-billeds 20–21 Jul in a *Boone*, IN industrial pond (CLH, RLH, LPv)—provided one of very few summer records for the state. Migrant Wilson's Phalaropes included one at *Grand Kankakee Marsh*, IN 15 & 17 Jul (BJG m.ob.), 2 juvs. at *Carl. L.* 16–26 Jul (DMK et al.), 2 juvs. at *Rice Lake W.M.A.* 31 Jul (TAM et al.), and one in *Jefferson*, IL 31 Jul (BSh). The season's only Red-necked Phalarope was at *Rice Lake W.M.A.*, IL 31 Jul (TAM et al.).

GULLS THROUGH HUMMINGBIRDS

Laughing Gulls' numbers were typical, with 3 in Illinois and 2 in Indiana. Some 5000+ Ring-billed Gull nests were reported at the L. Cal. colony this season (WJM). Once again, Ring-billeds nested on rooftops in *Des Plaines*, IL, where 60 nests were counted and 102 young banded 17 Jun (VK, AA et al.). Summer Lesser Black-backed Gulls are rare in the Chicago area; consequently, the single bird observed at *Montrose* 20 Jul (UG) was noteworthy. The presence of

numerous Caspian Terns in fresh juv. plumage along the Indiana lakefront suggests that nesting at the Indiana steel mills was successful this year. No information was received about the G.L.N.T.C. Common Tern breeding colony that was active last year. Four Least Tern reports from Illinois did not involve breeding birds; however, some 80 nests were counted at the *Gibson*, IN breeding site, though productivity remained low there (JSC). One of the summer's best finds was Illinois's 2nd Black Skimmer, which appeared in *Springfield*, IL 23 Jul (ph., †HDB, BD, TAM, KAM).

The peak tally among scores of Eurasian Collared-Dove reports consisted of 14 in *Granite City*, IL 24 Jul (FHo). The Region's most impressive dove report, however, involved 2000 Mourning Doves at *Sauget*, IL 17 Jul (DMK). During the season, some 99 Monk Parakeet nests were counted in s. Chicago and adjacent suburbs (WJM). Perhaps related to the spring's cicada eruption, cuckoo numbers were up this season. Across the Region there were eight Black-billed reports in Illinois and another seven in Indiana. Yellow-billed Cuckoos were also unusually prevalent, with seven double-digit counts and a maximum tally of 20 in *Monroe*, IN 5 Jun (RBr).

Indiana had its first summer report of a non-injured Snowy Owl. Ben Vineyard first saw this ad. in *Tippecanoe* 15 Jul (though some reports suggest it had been present for two or three weeks), and a Department of

Natural Resources officer subsequently re-found the bird 26 Jul near I-65 in White, where it was confirmed the following day (LPv, LAB). The owl remained at this site until it was hit by a vehicle on 15 Aug and ultimately died in rehabilitation. Peak Chuck-will's-widow counts included 5 at Ferne Clyffe S.P., IL 4 Jul (EWW) and 3 in Monroe, IN 3 Jun (LWS). Additionally, one was heard in Sullivan, IN 3 Jun (LWS), providing a first county record. The largest Whip-poor-will tally, by far, consisted of 18 in Monroe, IN 2 Jun (LWS). A remarkable 500+ Ruby-throated Hummingbirds (94 of which were banded) were at Siloam Springs S.P., IL over the period (BSt).

FLYCATCHERS THROUGH WARBLERS

An Alder Flycatcher was seen in Chicago's Lincoln Park 16 Jun (GAW), the last of the migrants, but a singing bird at Beverly Shores, IN 26 Jun (JKC et al.) might have been on territory. Willow Flycatchers were quite plentiful, as indicated by maximum counts of 23 at Herrick L., IL 5 Jun (ES) and 19 at Beverly Shores, IN 12 Jun (JKC et al.). Western Kingbird reports were restricted to Illinois, where up to 2 inhabited the East St. Louis nest site 12 Jun-19 Jul (DMK, KAM) and another was reported in Madison 1 Jun-20 Jul (FHo). Also in Illinois, unsuccessful Scissor-tailed Flycatcher nests were reported at Lenzburg (fide DMK) and in Union (DMK, KAM, m.ob.). Another Scissor-tailed sighting came from w. Macon, IL 14 Jul (TAM). Although Loggerhead Shrike reports in Illinois included at least two pairs with young in Edwards (EWW) and a peak of 5 at Carl. L. 22 Jul (DMK), this species was disturbingly scarce in Indiana. Despite systematic searches throughout former Loggerhead stronghold areas in Daviess and Sullivan, IN, no shrikes, nor any evidence of impaled prey, could be found this summer (LWS, KBu). A remarkable 47 Bell's Vireos were counted in the reclaimed Sullivan, IN strip mines 4 Jul (LWS). Most surprising was a singing male Blue-headed Vireo at Pokagon S.P., IN Jul 8 (Haw, FHe, SS), which provided a 2nd Jul record for ne. Indiana.

The largest swallow concentrations included 425 Purple Martins in Springfield, IL 24 Jul (KAM et al.), 800+ Tree Swallows in Fulton, IL 11 Jul (LHo), 2500 Bank Swallows at Chau. 25 Jul (TAM), and 300 Cliff Swallows at Carl. L. 10 Jul (DMK). Quite unexpected were at least 2 Red-breasted Nuthatches that remained in Chicago's Morton Arboretum from late May through 2 Jul (ES, EWW). Sedge Wrens were plentiful, as evidenced by eight double-digit counts across the Region. A fine Marsh Wren tally of 20+ was logged at Garden Prairie Slough, Boone 3 Jul (DTW). In Illinois, the L.M.S.F. remained quite productive, yielding a hefty

count of 24 Veerys on 5 Jul (DFS). On 5 Jul Lisa and Gary Bowman discovered and photographed Indiana's first Sage Thrasher at the reclaimed Universal Mine in Vermillion. A tardy Nashville Warbler was observed in Chicago's Lincoln Park 9 Jun (GAW). Unusually large breeding-season warbler tallies included 19 Northern Parulas in Oconee, IL 9 Jul (DMK), 122 Yellow Warblers at Kankakee W.M.A., IN 5 Jun (JKC et al.), 39 Prothonotary Warblers along a 16-km drive at Kankakee W.M.A. 5 Jun (SRB et al.), and 43 Ovenbirds at L.M.S.F. 5 Jul (DFS). Most unexpected was a singing Magnolia Warbler in Pokagon S.P. 3 Jul (BB, DR, FW). Black-throated Green Warblers continued their infiltration of the Region's breeding avifauna, with 10 reports in Indiana and two in Illinois. A territorial pair of Pine Warblers summered in an Indiana Dunes S.P. pinery. A male was seen 5 Jun (SRB, JKC, LSH, KJB), the first summer lakefront record in 100 years, and was heard singing 15 Jun (RJP). J. J. McCoy saw the pair 3 Jul and a juv. on 12 Aug. This constitutes the first Jul record for the Indiana Dunes in 130 years. Peak Cerulean Warbler tallies included 9 at L. Monroe, IN 3 Jun (MCI) and 8 in Mississippi Palisades S.P., IL 11 Jul (EWW). Fourteen Worm-eating Warblers were recorded on a B.B.S. in Hoosier N.E. 7 Jun (LWS). An exciting report of a Swainson's Warbler in Johnson, IL 29 Jun-5 Jul (AS, BSh, LHa) was not accompanied by documentation. A male Mourning Warbler was found at I.B.S.P. 1 Jul (EWW), and a first-year female, identified in the Indiana Dunes 25 Jul (SRB), was presumably an overeager migrant, besting the previous early fall date of 6 Aug 1988 by almost two weeks.

SPARROWS THROUGH FINCHES

For the 2nd consecutive summer, Clay-colored Sparrows nested in ne. Illinois. This year, an ad. and 3 young were observed in Aurora West Forest Preserve, Kane 23 Jul (ES). Another Clay-colored was reported at Orland Grasslands, Cook, IL 26 Jun (WSS). The Region's Grasshopper Sparrow population appears to be flourishing, as evidenced by counts of 42 in a Pike, IN reclaimed strip mine (JID) and 33 at Hennepin L., IL 2 Jul (DFS). Henslow's Sparrows were also plentiful, with a peak tally of 45 in the w.-cen. Indiana reclaimed strip mines 8 Jul (LWS). As occurred last summer, a White-throated Sparrow lingered, this one at Chicago's Montrose Harbor 20 Jul (UG). A very late Dark-eyed Junco was observed in Poplar Grove, Boone, IL 21 Jun (AB). Prior to 2004, Blue Grosbeak was casual to accidental on the Indiana lakefront. On 3 Jul, a pair was discovered in scrubby interdunal vegetation just inland from Mill. B. and w. of the Lake Street parking lot (MTo, JJM), with one or 2 record-

ed at that site through the end of the period (m. ob.). This represents a major breeding-season range expansion in the state. The male Painted Bunting at East St. Louis, banded in 2003, was present again this summer 3 Jun-19 Jul (KAM, DMK, m.ob.); 2 males were reported at that site 10 Jul (DTW).

It was another fine season for Dickcissels, with peak tallies of 186 in w.-cen. Indiana 4 Jul (LWS) and 102 in Jamestown, IL 2 Jun (DMK). Bobolinks were also widespread in good numbers; peak counts included 32 at Orland Grassland, IL 3-4 Jun (WSS, GAW) and 25 at the Burnidge Forest Preserve, IL 27 Jun (UG). Noteworthy meadowlark tallies included 64 Easterns in Beaucoup, IL 1 Jun (DMK) and 18 Westerns in Atkinson, IL 19 Jun (DFS). Yellow-headed Blackbirds successfully nested at L. Cal. (Eggers Woods), where a pair and 2 young were observed 26 Jun (WJM). Breeding also apparently occurred in DuPage, IL, as 3 ads. and a juv. were seen in Pratts Wayne Woods 4 Jul (UG). The largest Brewer's Blackbird concentration was in s. LaPorte, IN, where 17 were counted 19 Jun (JJM et al.). Orchard Orioles were widespread and abundant, with peak tallies of 10 in Columbia, IL 18 Jun (KAM) and 9 in LaGrange, IN 9 Jun (JKC). A late departing male Purple Finch lingered in Monroe, IN until 3 Jun (fide J&SH). The northernmost Eurasian Tree Sparrow was detected in Bond, IL, with one there 27 May (CM).

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State of the Region

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To borrow a realtor's cliché: in the Illinois & Indiana Region, the three most important concerns for bird conservation are habitat, habitat, and habitat. An informal survey of almost two-dozen veteran Regional birders revealed that, without exception, habitat loss was considered the major threat to species of special concern and to more numerous, widespread species. Indeed, habitat preservation and restoration topped every correspondent's list of priorities for bird conservation. Habitats in these two states, now vastly altered by two centuries of European settlement, are comprised of hardwood forests in the extreme south (Bird Conservation Region [BCR] 24), agricultural lands once correctly called the Eastern Tallgrass Prairie (BCR 22) in the center, and the Prairie-Hardwood Transition (BCR 23) in the northern margins. Changes to habitats in these areas are most profound in farmland and urban centers, but in fact very few fragments of "intact" habitat remain in the Region.

Human population growth and one of its major consequences, urban sprawl, were identified as the chief forces driving habitat loss. Numerous correspondents mentioned the permanent loss of former prime habitat to housing developments and shopping malls as economic growth, especially during the 1990s, vastly expanded the suburbs of most large cities in Illinois and Indiana. In Illinois alone, forests have been reduced from 14 million to four million acres since 1800, and what remains is mostly fragmented, favorable for generalists and species that use or tolerate edge-habitats well, such as Blue Jay, Northern Cardinal, Indigo Bunting, and Downy Woodpecker, but not for specialized species of the forest interior such as Worm-eating Warbler or Acadian Flycatcher. The rise in the number of summer homes, usually in forests and along lakeshores, has contributed to the loss and fragmentation of forest. Even in open habitats, rural building disrupts nesting birds: Judy Pollock points out that development in Kane County in northeastern Illinois threatens the only nesting population of Swainson's Hawks east of the Mississippi River. Human development and its infrastructure almost invariably fragment and degrade natural habitats, as well as bringing an increase in mammalian predators (domestic and wild), cowbirds, and in some cases exotic flora. Wood Thrush, once common in the hardwood forests, has declined drastically here, according to Breeding Bird Survey data; it is susceptible to multiple types of forest degradation. Jeff Walk points out that, in the absence of natural disturbances, historically provided by fire, the composition of Illinois forests is also being degraded by the growth of maples and exotic flora such as buckthorns and honeysuckles. Roger Hedge noted recent research that suggests that these spreading exotic plants provide little in the way of nutrition for native birds and thereby also negatively affect avian productivity. Natural or prescribed burning could help alleviate this problem. In many areas, the rapid increase of deer populations wreaks havoc with birds that breed in the forest understory and on the ground, such as Whip-poor-wills, Ovenbirds, and Black-and-white Warblers.

The agricultural fields and grasslands that remain in the central portions of Indiana and Illinois are but a shadow of the 40+ million acres of prairies present in the middle of the nineteenth century: essentially nothing remains of native prairie in these states, perhaps just 0.01%. In 1889, Robert Ridgway wrote: "we searched in vain for the characteristic prairie birds [...] and left our beautiful prairie with sad heart, disgusted with the change which civilization had wrought. [I]t will probably not be many years before a prairie in its primitive condition cannot be found within the limits of Illinois" (*The Ornithology of Illinois*). Greater Prairie-Chicken, the flagship species of this marvelous habitat, has declined from an estimated population of some 10 million birds to fewer than 80 in Illinois. The once-abundant Upland Sandpiper and Loggerhead Shrike, also tied to native prairie, are listed as either Endangered or Threatened in both states, as are Northern Harrier and Short-eared Owl. Shifts away from hayfields and livestock toward more sterile, modern row-crop agriculture, along with intense application of herbicides, insecticides, and rodenticides, has contributed to the decline of even generalist grassland birds. As in agricultural prairie states to the west, such as Iowa, there is some hope that careful management through the judicious use of mowing and burning and the avoidance of over-grazing could markedly improve our grasslands, at least for habitat generalists such as Grasshopper, Savannah, and Vesper Sparrows, Dickcissel, Bobolink, and both meadowlarks, some of which seemed to be declining despite federal programs such as the USDA's Conservation Reserve Program (CRP) within the Farm Bill. To be

effective, grassland conservation efforts for birds must involve relatively large contiguous blocks of structurally diverse habitat with minimal edge, controlled encroachment of woody plants and invasive exotics such as Garlic Mustard, and no mowing during the breeding season (a devastating practice permitted by a loophole in the CRP). Even with well-maintained grasslands, birds of true prairie—such as Henslow's Sparrow—derive very little benefit from fallow farm fields. Though there is surely some conservation benefit to be realized in making unfarmed fields more productive for grassland species, the restoration of native prairie is far more time-consuming and expensive; efforts in this direction are still in their infancy in Illinois and Indiana. A useful publication for interested parties is *Illinois Prairie, Past and Future: A Restoration Guide*, available from the Illinois Department of Conservation, Division of Natural Heritage.

Economic factors, often linked to regulatory agencies and governmental land-use policies, have profound and far-reaching impacts on birds and their habitats in this Region. John Castrale notes, for example, that in Indiana changes in the farm economy (affecting which crops are planted), agricultural technology and practices, and farm programs (mainly the federal Farm Bill) all have tremendous consequences for birds, especially grassland species. Similarly, Keith McMullen notes that recent changes in federal regulations have rendered isolated prairie wetlands vulnerable to filling without the requirement of a permit. Travis Mahan comments

that in some cases habitat "enhancement" projects are too frequently aimed at producing more huntable wildlife, rather than having balanced biodiversity as the goal. Outside the hunting season, naturally, some habitats developed for game species can provide suitable habitat for shorebirds, marsh-birds, and waders.

The degradation of native wetlands and waterways is cause for alarm in both Indiana and Illinois, with many of the remaining wetlands being choked out of existence by Purple Loosestrife and *Phragmites*. In the open waters of Lake Michigan, Zebra Mussels would appear to be a boon to sea ducks and bay duck, but in fact these introduced mollusks extract plankton, which severs the lake's food web at its very foundation. Moreover, it appears likely that Zebra Mussels' tissues concentrate toxins, including potentially bio-accumulative substances that in the long term could damage birds that consume them. Pollution, including that produced by mosquito spraying, along with industrially produced base metals and various organic compounds (many of which currently remain trapped in aquatic sediments), poses a continuing environmental problem, one poorly addressed at the federal level at present.

One group of birds cited frequently by correspondents as in need of immediate attention was shorebirds. Shorebird management sites are sorely needed to provide feeding and resting sites for these long-range migrants. Dan Kassebaum suggests initiating a plan to incorporate shorebird management

areas, proactively, into the various reservoirs developed by the Corps of Engineers. Because their stopover habitat requirements are relatively clear—and their habitats simple and inexpensive to establish and manage—this concept would seem worthy of implementation, especially given the dramatic losses of floodplain habitat in the age of river management.

Finally, correspondents also listed a number of conservation concerns that are less specific to this Region. Foremost among these were window kills, the impact of feral cats, and the increased numbers of bird strikes at communication towers. Estimates of the number of birds killed annually by flying into glass exceed one billion. The heavy toll taken by feral and domestic cats is well known and, more specifically, may be a factor in depressing Northern Bobwhite populations. The proliferation of cell-phone and television towers, well-documented hazards for nocturnal migrants, also contributes to avian mortality.

Despite all of these dark clouds, it is worth emphasizing that a number of important bird conservation successes have been achieved. Fine examples in the Greater Chicago area include The Nature Conservancy's recent wet prairie restoration at Kankakee Sands in northwestern Indiana and the grassland restoration efforts in Cook County, Illinois. According to Judy Pollock, it is estimated that Chicago's *Lights Out* program and Chicago Bird Collision Monitors will save the lives of over 10,000 migratory birds per year. Farther afield, reclaimed strip mines in the southern parts of the Region have been an unexpected bonus for grassland species, including specialists like Henslow's Sparrow. Recognizing that we will forever face entirely new and unexpected challenges in bird conservation, such as the recent epidemic of West Nile virus, Walter Marcisz suggests that our most critical challenge is to remain intellectually vigilant, to imagine creative, effective solutions to unanticipated conservation problems before they arise—and to be prepared to implement these solutions in a timely manner. In such a shift from the reactive to the proactive, bird conservation on this continent may yet hold promise.



A disappearing songbird that has received much attention in recent years, Henslow's Sparrow (here at Goose Lake Prairie State Park, Illinois) is classically a species of eastern tall-grass prairie, but it can adapt to reclaimed strip-mined land and other disturbed habitats, though not with the flexibility of its congener Grasshopper Sparrow, whose populations are also declining continentally. In Illinois and Indiana, suburban sprawl and modern agriculture limit the areas that might be restored for this and other prairie birds. Photograph by Christopher L. Wood.